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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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TOWNSEND AND TOWNSEND AND CREW, LLP  
TWO EMBARCADERO CENTER  
EIGHTH FLOOR  
SAN FRANCISCO, CA 94111-3834

EXAMINER

D AGOSTA, STEPHEN M

ART UNIT	PAPER NUMBER
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2683

DATE MAILED: 07/30/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

**Application No.**

09/648,908

**Applicant(s)**

SHUPE ET AL.

**Examiner**

Stephen M. D'Agosta

**Art Unit**

2683

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 23 July 2003.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-25 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-25 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

### Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)                   | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____. |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)          | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____. | 6) <input type="checkbox"/> Other: _____.                                   |

## DETAILED ACTION

### *Response to Arguments*

Applicant's arguments with respect to claim 1-25 have been considered but are moot in view of the new ground(s) of rejection.

1. New art has been cited which addresses the point of the HLR automatically updating the MSC without prompting from MSC. Foti teaches an HLR in communication with a mobile (through MSC-1) that, after a subscriber feature change, sends an update to another MSC automatically without prompting (C6, L46 to C7, L32, specifically C7, L22-32). Since the applicant's specification teaches contacting customer service to change one's profile, this would require a switch/MSC for connectivity. Likewise, Foti teaches a feature change via a mobile-to-MSC#1 link that automatically spawns a change to MSC#2 which reads on the claim language.

### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

**Claims 1-2, 4-6, 8-11 and 15-24** rejected under 35 U.S.C. 103(a) as being unpatentable over Sonti in view of Foti US 5,913,165 US Patent 6,256,379 (hereafter Sonti and Foti).

As per **claim 1-2, 4-6, 8 and 23**, Sonti teaches a wireless communications system including a Service Location Register, Switching Center and a subscriber (figure 1) the subscriber having at least one profile associated with the subscriber (abstract and figures 2-4), a method of automatically updating the Switching Center with a change in the subscriber's profile comprising:

Receiving an update at a database regarding a change in the subscriber's profile  
~~Initiating a stored procedure in the database to generate~~ generating a request to the Service Location Register to send a profile update for the subscriber to the Switching Center ~~for the subscriber~~ (C8, L25-67, specifically L57-60 which states that the HLR sends any/all valid profile updates to the MSC without MSC intervention).  
**But is silent on** in response to the request and without any prompting by the MSC.

Foti teaches changing service features/profiles for a subscriber whereby a change made in the HLR (and MSC#1) can automatically cause an update in MSC#2 (C6, L46 to C7, L32).

It would have been obvious to one skilled in the art at the time of the invention to modify Sonti, such that MSC prompting is not required, to provide automatic updates to an MSC(s) when an update occurs.

As per **claim 2**, Sonti teaches and HLR (C8, L57-60).

As per **claim 4**, Sonti teaches an MSC (C8, L57-60).

As per **claim 5**, Sonti teaches a wireless communication system including an HLR, MSC and a plurality of subscribers (figure 1) each of the subscribers having at least one profile associated with the subscriber, a method of automatically updating the MSC with a change in the subscriber profile, comprising

Receiving an update at a database regarding a change in the subscriber profile  
Initiating a stored procedure in a the database to generate a request to the HLR to send a Qualification Directive (QUALDIR) to the MSC ~~for the subscriber~~ the qualdir including an update to the subscriber profile,

Sending the QUALDIR message to the MSC. (C8, L25-67, specifically L57-60 which states that the HLR sends any/all valid profile updates to the MSC without MSC intervention AND figure 7 shows a QUALDIR message w/profile between the MSC and HLR);

~~But is silent on~~ But is silent on in response to the request and without any prompting from the MSC.

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Foti teaches changing service features/profiles for a subscriber whereby a change made in the HLR (and MSC#1) can automatically cause an update in MSC#2 (C6, L46 to C7, L32).

It would have been obvious to one skilled in the art at the time of the invention to modify Sonti, such that MSC prompting is not required, to provide automatic updates to an MSC(s) when an update occurs.

As per **claim 6**, Sonti teaches a wireless system having at least one subscriber with at least one profile, including a Service Location Register (SLR), Switching Center and a subscriber (figure 1), a system for automatically updating the Switching Center with a change in the subscriber's profile, the system comprising;

A database configured in communication with the SLR, the database operative to receive an update regarding a change in the subscriber's profile and initiate a stored procedure to generate a request the SLR to send a profile to the Switching Center (C8, L25-67, specifically L57-60 which states that the HLR sends any/all valid profile updates to the MSC without MSC intervention).

A SLR in communication with the database and being configured to:

Receive the request to send the profile update to the MSC (C8, L25-67, specifically L57-60).

**But is silent on** In response to the request and without receiving any prompting from the MSC, send the profile update to the MSC

Foti teaches changing service features/profiles for a subscriber whereby a change made in the HLR (and MSC#1) can automatically cause an update in MSC#2 (C6, L46 to C7, L32).

It would have been obvious to one skilled in the art at the time of the invention to modify Sonti, such that MSC prompting is not required, to provide automatic updates to an MSC(s) when an update occurs.

As per **claim 8**, Sonti teaches an MSC (C8, L57-60).

As per **claims 9, 11 and 20-22, 24**, Sonti teaches claim 6 **but is silent on a Sybase database and a stored procedure.**

The examiner interprets the MSC, HLR and/or VLR as hardware devices which contain database software to perform various functions and hence, the examiner takes **official notice** that commercially available database software used would include Sybase, Oracle, SQL Server, etc. as well as databases providing the ability to initiate stored procedures as programmed by the user.

As per **claims 10 and 18-19**, Sonti teaches claim 6 wherein the request generated by the database is a QUALDIR message qualification directive (figure 7 shows a QUALDIR message w/profile between the MSC and HLR).

**As per claims 15-17**, Sonti is silent on including at least one feature set.  
Foti teaches changing service feature(s) [title].

It would have been obvious to one skilled in the art at the time of the invention to modify Sonti, such that service features are included, to provide means for automatically updating MSC profiles and service features.

~~**Claims 3 and 7** rejected under 35 U.S.C. 103(a) as being unpatentable over Sonti in view of Gillespie US Patent 6,256,379 (hereafter Gillespie).~~

**Claims 3 and 7** rejected under 35 U.S.C. 103(a) as being unpatentable over Sonti/Foti and further in view of Dougherty US 6,393,271 (hereafter Dougherty).

As per **claim 3**, Sonti teaches claim 1 and service registers **but is silent on a WSLR.**

Dougherty teaches a system/method for wireline-based registration of wireless device (title and abstract and figure 1, #24).

It would have been obvious to one skilled in the art at the time of the invention to modify Sonti, such that a WSLR is used, so that a WSLR can be used instead of (or in place) of a generic Service Location Register.

As per **claim 7**, Sonti teaches claim 6 and service registers **but is silent on a WSLR**.

Dougherty teaches a system/method for wireline-based registration of wireless device (title and abstract and figure 1, #24).

It would have been obvious to one skilled in the art at the time of the invention to modify Sonti, such that a WSLR is used, so that a WSLR can be used instead of (or in place) of a generic Service Location Register.

**Claims 12-14 and 25** rejected under 35 U.S.C. 103(a) as being unpatentable over Sonti/Foti and further in view of Chang et al. US 5,958,016 (hereafter Chang).

As per **claims 12-14 and 25**, Sonti is silent on use of Web/Internet.

Chang teaches use of Web/Internet to allow subscriber profile changes and for subscriber access to billing, profiles, etc. (title, abstract, figures 1-2 and C2, L7-67 and C4, L45-58 - The control data input by the subscribers may control services facilitated through high level network control points. In an intelligent network implementation of a telephone network, for example, the control data is used to establish or modify call processing records stored in a service control point. The control data also may be used to modify individual subscriber profiles in central office switching systems of the telephone network.).

It would have been obvious to one skilled in the art at the time of the invention to modify Sonti , such that Web/Internet access can be used, to provide ubiquitous access to anyone wishing to view their account AND/OR for allowing customer service to be remotely located from the MSC/HLR/Servers.

**Conclusion**

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Stephen M. D'Agosta whose telephone number is 703-306-5426. The examiner can normally be reached on M-F, 8am to 5pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bill Trost can be reached on 703-308-5318. The fax phone numbers for the organization where this application or proceeding is assigned are 703-872-9314 for regular communications and 703-872-9314 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-306-0377.

SMD  
July 25, 2003

  
WILLIAM TROST  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 2600